

### **Abstract**

A system for receiving and processing signals received from a plurality of endpoints. Each endpoint includes an endpoint transmitter in electrical communication with a power distribution line within a power distribution system. The system comprises a power line coupler. A substation receiver is in electrical communication with the power line coupler. A substation circuit is in electrical communication with the substation transceiver. The substation circuit is configured to simultaneously demodulate signals received from the plurality of different endpoints.